

## **REMARKS**

Claims 1 and 23-40 are pending in the application. With this Amendment, claim 1 has been canceled as the same was only presented in order to provide continuity from the parent application to the current continuation application. New claims 41 and 42 have been added to further define the invention. Support for the subject matter set forth therein is present on at least page 28, second full paragraph.

The Henkel reference cannot anticipate nor teach new claims 41 and 42. As set forth on page 10, fourth full paragraph of the Henkel translation, Henkel's compositions contain only 0.02 to 5 parts by weight of the compounds of the Formulas I and II (organic thiol) to 100 parts by weight of the polymerizate, well below Applicants' claimed range.

Claims 23-40 have been rejected on the grounds of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-22 of U.S. Patent No. 6,762,231. In order to overcome the double patenting rejection, a Terminal Disclaimer is submitted herewith showing that the claims of the application and conflicting patent are commonly owned, as well as the proper disclaimer of patent term extension.

Claims 23-40 have been rejected under 35 U.S.C. §102(b) as being anticipated by Henkel KgaA DE 32 47 736. The Examiner states that Henkel teaches Applicants' stabilized halogen containing polymer in claims 1, 3 and 4. The Examiner states that the presence of metallic stabilizers in claims 2 and 5 does not negate the fact that a metal free stabilization system is claimed in claims 1, 3 and 4. The Examiner further states the reference claims two systems of stabilization, with and without metallic stabilizers.

It is respectfully submitted that the Henkel cannot anticipate, nor teach or suggest Applicants' claimed compositions. Independent claim 23 claims a polymer composition of a chlorine-containing or a bromine-containing polymer and a heat stabilizer component consisting of the claimed organic thiol and optionally epoxidized soybean oil, thereby excluding metal-containing stabilizers. Likewise, independent claim 33 claims a polymer composition containing the noted polymer, noted organic thiol, and wherein the composition is free of a Lewis acid and a metal-containing stabilizer.

Henkel is not in possession of Applicants' specifically claimed invention. Claims 1, 3 and 4 of Henkel cited by the Examiner do not teach or claim a metal-free stabilization system. Claim 1 of Henkel claims "stabilized polyvinyl" chloride molding compounds containing, at least, (emphasis added), an organic thiol compound. Thus, claim 1 and also claims 3 and 4 which depend on claim1, are open to the inclusion of additional components.

As set forth in the Detailed Description of Henkel on page 15, second full paragraph of the translation, Henkel states:

"In the simplest scenario, the stabilizer combination for polyvinyl chloride molding compounds in accordance with the invention is comprised of a primary stabilizer which is selected from the group which consists of metal soaps, aromatic metal carboxylates, and metal phenolates, and a compound of Formula I or II" (emphasis added).

Thus, in Henkel's own words, the simplest teaching of his invention requires both a metal-containing stabilizer and an organic thiol.

Section 2141.02 of the MPEP states that "Ascertaining the differences between the prior art and the claims at issue requires interpreting the claim language (of the application being examined), and considering both the invention and the prior art references as a whole." Furthermore, the last portion of the noted Section includes the heading "PRIOR ART MUST BE CONSIDERED IN ITS ENTIRETY, INCLUDING DISCLOSURES THAT TEACH AWAY FROM THE CLAIMS." The Federal Circuit has further stated "A prior art reference must be considered in its entirety, i.e., as a whole, including portions that would lead away from the claimed invention." W. L. Gore & Associates, Inc. v. Garlock, Inc., 721 F.2d 1540, 220 USPQ 303 (Fed. Cir. 1983), cert. denied, 469 U.S. 851 (1984). In *In re Wesslau*, the Court of Customs and Patent Appeals cautioned that "it is impermissible within ...to pick and choose from any one reference only so much of it as will support a given position, to the exclusion of other parts necessary to the full appreciation of what such reference fairly suggests to one of ordinary skill in the art." 353 F.2d at 241, 147 USPQ at 393. In Bausch & Lomb, Inc. v. Barnes-Hind/Hydrocurve, Inc., 796 F.2d 443, 230 USPQ 416 (Fed. Cir. 1986), cert. denied, 484 U.S. 823 (1987), on remand, 10 USPQ 2d 1929 (N.D. Calif. 1989), the

Federal Circuit held that a single line in a prior art reference should not be taken out of context and relied upon with the benefit of hindsight to show obviousness. Rather, a reference should be considered as a whole, and portions arguing against or teaching away from the claimed invention must be considered. Moreover, according to Markman v. Westview Instruments, 52 F.3d 967, 979-980, 34 USPQ 2D 1321, 1329 (Fed. Cir. 1995), *aff'd*, 517 U.S. 370, 134 L. Ed. 2d 577, 116 S. Ct. 1384 (1996), "claims must be read in view of the specification, of which they are a part."

Henkel describes the use of the primary metal stabilizers in conjunction with the organic thiols throughout his specification.

The last three lines at the bottom of page 5 state that the mentioned metal compounds are usually described as primary stabilizers and to improve their effectiveness, secondary or co-stabilizers are frequently added to them.

In the "Background of the Invention" on page 6, bottom of the first full paragraph, Henkel states that there is a need for substances with the assistance of which the initial and/or long term effect of such stabilizer systems (the metal-containing stabilizers already known) can be decisively improved.

Lines 2 and 3 of page 7 state that it has been found that the mercapto compounds of Henkel are capable of enhancing the stabilizing effect of primary stabilizers, with specific emphasis on the initial stability.

The paragraph beginning at the bottom of page 7 of Henkel states that the stabilized molding compounds also contain a stabilizer combination of 1) primary stabilizers selected from the group consisting of metal soaps, etc. as well as 2) co-stabilizer, characterized in that they contain compounds of Formulas (I) and (II) as co-stabilizers.

The third and fourth paragraphs of page 16 state that the stabilizer combinations in accordance with the invention may contain other ingredients.

Further support for Applicants position is found in the Example section wherein every example utilizes a stabilizer combination of a metal-containing stabilizer as well as an organic thiol compound. Examples A-F all contain calcium stearate and zinc stearate in combination with the organic thiol, see especially Table 1. In Example 2, examples G-L all contain calcium stearate and some contain aluminum. Examples I, J, and L additionally contain sodium aluminum silicate. Please see Table 2 also. Finally,

Example 3 utilizes a combination of zinc stearate and barium stearate as metal-based stabilizers in the stabilizer combination.

It is respectfully submitted that claim 1 cannot be solely interpreted as the Examiner suggests and that Henkel was not in possession of the Applicants invention as claimed wherein the polymer composition includes a heat stabilizer component consisting of only an organic thiol and optionally epoxidized soybean oil, or an organic thiol as a stabilizer component which is free of a metal-containing stabilizer. If Henkel was in possession of Applicants' invention, at least one of the examples would have utilized the succinate-based organic thiols independently of a metal-containing stabilizer. According to statute as well as the case law, the Henkel reference, when taken as a whole, from the weight of the evidence presented cannot teach or suggest Applicants' claimed invention.

It is also indicated hereinabove, new claims 41 and 42 cannot be anticipated, nor taught or suggested as Henkel can only utilize up to 5 parts of organic thiol per 100 parts by weight of the polymer.

It is respectfully submitted that the claims are in condition for allowance and a Notice of such is earnestly solicited. Should the Examiner have any questions or concerns regarding this response, a telephone call to the undersigned is greatly appreciated in order to expedite allowance of the application.

Respectfully submitted,

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